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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/751,659	12/30/2000	Brian James Martin	55,419 (70158)	8881

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EXAMINER	
TANG, KENNETH	

ART UNIT	PAPER NUMBER
2195	

DATE MAILED: 06/16/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	09/751,659	MARTIN, BRIAN JAMES	
	Examiner	Art Unit	
	Kenneth Tang	2195	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *07 October 2004*.

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-43* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-43* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on *18 June 2001* is/are: a)☒ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

DETAILED ACTION

1. This action is in response to the Amendment filed on 10/7/04. Applicant's arguments have been fully considered but were not found to be persuasive. Amendment to the claims have also prompted new grounds of rejections.

2. Claims 1-43 are presented for examination.

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

> The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

3. Claims 1-4, 7, 23, 31, 33, 35, and 37-39 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention:

a. The term "substantially" in claim 1 is a relative term which renders the claim indefinite. The term "substantially" is not defined by the claim, the specification does not provide a standard for ascertaining the requisite degree, and one of ordinary skill in the art would not be reasonably apprised of the scope of the invention.

b. The terms "acceptable" and "unacceptable" in claim 5 are relative terms which renders the claim indefinite. The terms "acceptable" and "unacceptable" are not defined by the claim, the specification does not provide a standard for ascertaining the requisite degree, and one of ordinary skill in the art would not be reasonably apprised of the scope of the invention.

Double Patenting

The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970);and, *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

4. Claim 5 is provisionally rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claim 23 of copending Application No. 09/675396 in view of Zolnowsky (US 5,826,081). Although the conflicting claims are not identical, they are not patentably distinct from each other because both computer systems comprise substantially the same elements, such as determining methodology, creating N partition locks, and modifying the locking requirements. The differences between the parent application and this case is the claimed dispatch groups and relating dispatching objects to those groups. However, Zolnowski teaches it is common knowledge in the art to have dispatcher groups in queues and that there are objects relating to the dispatcher *(col. 5, lines 46-48 and col. 1, lines 52-67)* in order to control and synchronize when the dispatcher needs to dispatch or wait. It would have been obvious to one of ordinary skill in the art at the time the invention was made to include the feature of combining dispatch groups and relating dispatching objects to those groups because the dispatcher groups and the related objects provide the data structure and mechanism

that allows for the dispatcher to control and synchronize when the dispatcher needs to dispatch or wait. In addition, Applicant's Admitted prior art teaches that it is well known to use dispatcher objects *(see Specification, page 7, line 11)*.

5. This is a provisional obviousness-type double patenting rejection because the conflicted claims have not in fact been patented as.

6. Claims 1-4 and 8-43 are rejected as a provisional obvious-type double patenting rejection as applied to claim 5 above.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

7. Claims 1-4 are rejected under 35 U.S.C. 103(a) as being unpatentable over Zolnowsky (US 5,826,081) in view of Hanrahan (Google groups, Newsgroups: comp.os.ms-windows.programmer.nt.kernel-mode).

8. As to claim 1, Zolnowsky teaches a parallel dispatching and wait signaling method for protecting data items of a dispatcher of an operating system, the parallel dispatching and wait signaling method comprising the steps of:

- creating N local locks, each N local lock for a where N>_2 *(col. 6, lines 28-42)*;

- acquiring one of the N local locks to perform one of dispatching or wait signaling operation, thereby locking a given subset of the dispatcher database *(col. 6, lines 35-38)*;
- limiting access of the data items of the given subset to the one of dispatching or wait signaling operation to be performed for that given subset *(col. 1, lines 52-67)*; and
- concurrently maintaining access to the data items of unlocked subsets of the dispatcher database so that the operating system maintains a substantially operational state *(col. 2, lines 18-30)*.

Zolnowsky fails to explicitly teach using a database for the dispatcher. However, Hanrahan teaches using locks with a dispatcher database *(page 2, lines 20-26)*. It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the feature of Hanrahan's dispatcher database with the dispatching locks of Zolnowsky because the dispatcher database holds the states of the threads to be executed on the processor and the locks provide the control/mechanism of the "holding." In addition, Applicant's Admitted prior art section teaches the use of dispatcher databases *(see Specification, page 8, lines 12-14)*.

9. As to claim 2, Zolnowsky teaches the parallel dispatching and wait signaling method of claim 1, wherein:

- said acquiring includes acquiring a plurality of the N local locks thereby locking a plurality of subsets of the dispatcher database *(col. 6, lines 35-38)*; and
- said limiting includes limiting access of the data items of the locked plurality of subsets to the one of dispatching or wait signaling to be performed *(col. 1, lines 52-67)*.

10. As to claim 3, it is rejected for the same reasons as stated in the rejection of claims 1 and 2. In addition, Zolnowsky teaches using global locks *(col. 3, lines 62-67)*.

11. As to claim 4, it is rejected for the same reasons as stated in the rejections of claims 2 and 3.

12. **Claims 5-43 are rejected under 35 U.S.C. 103(a) as being unpatentable over Zolnowsky (US 5,826,081) in view of Hanrahan (Google groups, Newsgroups: comp.os.ms-windows.programmer.nt.kernel-mode), in view of Frey et al. (hereinafter Frey) (US 6,502,103 B1), and further in view of Johnson (US 5,721,943).**

13. As to claim 5, it is rejected for the same reasons as stated in the rejection of claim 1. In addition, Zolnowski also teaches determining a methodology to form one or more dispatch groups including any of threads, resources, and events that frequently interact with each other *(col. 5, lines 46-48, and see Abstract)* and evaluating the operating system after said modifying the locking requirements so as to determine if the overall performance of the operating system is acceptable *(col. 5, lines 45-58)*. Zolnowski teaches dispatchable objects *(col. 1, lines 52-67)* but fails to explicitly teach relating dispatchable objects to dispatchable groups. However, Frey teaches an Object Management Group (OMG) that relates objects with group *(col. 1, lines 64-67)*. It would have been obvious to one of ordinary skill in the art at the time the invention was

made to combine the feature of relating objects with groups in order to enhance the usability, portability, reliability and interoperability of objects *(col. 1, lines 64-67)*.

14. Zolnowski, Hanrahan and Frey fails to explicitly teach when overall performance of the operating system is unacceptable, remodifying the locking requirements of all code paths of the one or more code paths of the operating system until overall performance of the operating system is acceptable. However, Johnson teaches a locking system which remodifies the locking requirements of the operating system based on rules of performance (whether they are acceptable or unacceptable) *(see Abstract, col. 2, lines 61-67 and col. 3, lines 1-57)*. It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the references of Johnson with Zolnowsky, Hanrahan and Frey because this provides the benefit of concurrent dynamic access to control data to the existing locking system of Zolnowsky, Hanrahan and Frey *(col. 1, lines 7-28)*.

15. As to claim 6, Frey teaches the method wherein said relating includes: separately identifying each dispatch group with a unique identifier identifying each dispatchable object of each group with said unique identifier *(col. 7, lines 55-60)*. In addition, Applicant's admitted prior art teaches that this is also well known in the art *(see Specification, page 4, lines 11-21)*.

16. As to claim 7, it is rejected for the same reasons as stated in the rejections of claims 1 and 5.

17. As to claim 8, it is rejected for the same reasons as stated in the rejection of claim 5. In addition, Zolnowsky teaches optimizing the locking requirements of the identified code path so one or more local locks are acquired and released in the identified code path, the one or more code paths being those associated with the dispatchable objects of the one or more dispatch groups touched by the identified code path *(col. 5, lines 41-44)*. Also, identifying the code path must be performed before optimization can occur.

18. As to claim 9, Zolnowsky teaches the method wherein the identified code path includes a plurality of branches, and wherein said optimizing includes optimizing the locking requirements of the identified code path so the one or more locks being acquired and released in the code path are those associated with the dispatchable objects being touched by each branch of the identified code path *(col. 5, lines 41-44)*.

19. As to claim 10, Zolnowsky teaches the method according to claim 9, wherein said optimizing includes optimizing the locking requirements of each branch of the identified code path so the one or more locks being acquired and. released in each branch are those associated with the dispatchable objects being touched by said each branch *(col. 5, lines 41-44)*.

20. As to claim 11, Zolnowsky teaches the method comprising the step of evaluating the modified operating system after said optimizing the locking requirements so as to determine if the overall performance of dispatching and wait signaling of the operating system is acceptable *(col. 5, lines 45-58)*.

21. As to claim 12, Zolnowsky teaches determining overall performance is acceptable but fails to explicitly teach repeating said steps of optimizing and evaluating for the another identified code path. However, it would be well known and obvious to one of ordinary skill in the art to keep trying to find acceptable performance when it is found unacceptable in order to eventually find acceptable performance.

22. As to claim 13, it is rejected for the same reasons as stated in the rejection of claim 9.

23. As to claim 14, Frey teaches the method wherein there is one of a plurality or a multiplicity of code paths that access one or more dispatchable objects *(col. 1, lines 58-67 through col.2, lines 1-2)*.

24. As to claim 15, it is rejected for the same reasons as stated in the rejections of claims 5 and 7. In addition, Frey teaches determining if the dispatchable object of an updating operation belongs to a dispatch group *(col. 5, lines 7-9)*, updating the dispatcher database portion *(Fig. 25, 2500 and 2508)*, and releasing the local lock following updating *(col. 39, lines 9-31)*.

25. As to claim 16, it is rejected for the same reasons as stated in the rejection of claim 6.

26. As to claim 17, it is rejected for the same reasons as stated in the rejection of claim 1. In addition, Frey teaches:

- updating the dispatcher database *(Fig. 25, 2500 and 2508)*; and
- releasing all locks following updating *(col. 39, lines 9-31)*.

27. As to claim 18, it is rejected for the same reasons as stated in the rejection of claim 3.

28. As to claim 19, Frey teaches the method wherein while acquiring the one of the one or more local locks, other portions of the dispatcher database are unlocked *(Fig. 25, 2500 and 2508, and (col. 39, lines 9-31)*.

29. As to claim 20, it is rejected for the same reasons as stated in the rejections of claims 5, 8, and 15.

30. As to claim 21, it is rejected for the same reasons as stated in the rejection of claim 6.

31. As to claim 22, it is rejected for the same reasons as stated in the rejection of claim 17.

32. As to claim 23, it is rejected for the same reasons as stated in the rejection of claims 17 and 19.

33. As to claim 24, it is rejected for the same reasons as stated in the rejection of claim 9.

34. As to claim 25, it is rejected for the same reasons as stated in the rejection of claim 15. In addition, Zolnowski teaches using an operating system *(col. 1, lines 21-30)*.

35. As to claim 26, it is rejected for the same reasons as stated in the rejection of claim 6.

36. As to claim 27, it is rejected for the same reasons as stated in the rejection of claim 17.

37. As to claim 28, it is rejected for the same reasons as stated in the rejection of claim 18.

38. As to claim 29, it is rejected for the same reasons as stated in the rejection of claim 19.

39. As to claim 30, it is rejected for the same reasons as stated in the rejection of claim 25. In addition, Zolnowsky teaches a computer-readable medium bearing program code *(col. 15, lines 1-3)*.

40. As to claim 31, it is rejected for the same reasons as stated in the rejection of claim 6.

41. As to claim 32, it is rejected for the same reasons as stated in the rejection of claim 17.

42. As to claim 33, it is rejected for the same reasons as stated in the rejection of claim 6.

43. As to claim 34, it is rejected for the same reasons as stated in the rejection of claim 2.

44. As to claim 35, it is rejected for the same reasons as stated in the rejection of claim 19.

45. As to claim 36, it is rejected for the same reasons as stated in the rejection of claim 17.

46. As to claim 37, it is rejected for the same reasons as stated in the rejection of claim 17.

47. As to claim 38, it is rejected for the same reasons as stated in the rejection of claim 3.

48. As to claim 39, it is rejected for the same reasons as stated in the rejection of claim 6.

49. As to claim 40, it is rejected for the same reasons as stated in the rejections of claims 25 and 30. In addition, Zolnowsky teaches a using a plurality of processors *(see title)*.

50. As to claim 41, it is rejected for the same reasons as stated in the rejection of claims 2 and 6.

51. As to claim 42, it is rejected for the same reasons as stated in the rejection of claim 17.

52. As to claim 43, it is rejected for the same reasons as stated in the rejection of claim 23.

Response to Arguments

53. During patent examination, the pending claims must be "given their broadest reasonable interpretation consistent with the specification." *In re Hyatt*, 211 F.3d 1367, 1372, 54 USPQ2d 1664, 1667 (Fed. Cir. 2000). Applicant always has the opportunity to amend the claims during prosecution, and broad interpretation by the examiner reduces the possibility that the claim, once issued, will be interpreted more broadly than is justified. *In re Prater*, 415 F.2d 1393, 1404-05, 162 USPQ 541, 550-51 (CCPA 1969).

54. Applicant argues on page 18 of the Remarks that there is no motivation to combine Zolnowsky with Hanrahan as suggested by the Examiner because to combine the substance of Hanrahan would defeat the intended purpose of Zolnowsky because the lock contention that Zolnowsky attempts to avoid would be reintroduced into the MP as taught by Hanrahan.

In response, the Examiner respectfully disagrees. There are many reasons (and not just one) why references can be combined. The references do not teach away from each other. Zolnowsky fails to explicitly teach using a database for the dispatcher. However, Hanrahan teaches using locks with a dispatcher database *(page 2, lines 20-26)*. It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the feature of Hanrahan's dispatcher database with the dispatching locks of Zolnowsky because the dispatcher database holds the states of the threads to be executed on the processor and the locks provide the control/mechanism of the "holding." In addition, Applicant's Admitted prior art section teaches the use of dispatcher databases *(see Specification, page 8, lines 12-14)*.

55. Applicant argues on page 18 of the Remarks that if the references of Zolnowsky and Hanrahan were combined, the claimed invention would not be obtained. Instead, we would obtain a single scheduler controlling a plurality of local dispatch queues, where lock contention

would undesirably occur at the scheduler and a separate global lock would still be maintained on the database.

In response, the Examiner respectfully disagrees. The Examiner has combined a specific feature in the teachings of the reference. The only feature that Zolnowsky fails to teach is using a database for the dispatcher. Hanrahan was used to demonstrate that the lacking feature is obvious to one of ordinary skill in the art. Hanrahan teaches using locks with a dispatcher database *(page 2, lines 20-26)*. It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the feature of Hanrahan's dispatcher database with the dispatching locks of Zolnowsky because the dispatcher database holds the states of the threads to be executed on the processor and the locks provide the control/mechanism of the "holding." In addition, Applicant's Admitted prior art section teaches the use of dispatcher databases *(see Specification, page 8, lines 12-14)*, and therefore, the Applicant admits that this is not novel.

56. Applicant argues on page 19 of the Remarks that none of the references as a part or whole in combination teach a parallel dispatching and wait signaling method for protecting data items of a dispatcher database of an operating system including the steps of creating N local locks, each N local lock for a subset of the dispatcher database, where N>2, acquiring one of the local locks to perform one of dispatching or wait signaling operation, thereby locking a given subset of the dispatcher database, limiting access of the data items of the given subset to the one of dispatching or wait signaling operation to be performed for that given subset and concurrently maintaining access to data items of unlocked subsets of the dispatcher database so that the operating system maintains a substantially operational state.

57. In response, the Examiner respectfully disagrees. Zolnowsky teaches a parallel dispatching and wait signaling method for protecting data items of a dispatcher of an operating system, the parallel dispatching and wait signaling method comprising the steps of creating N local locks, each N local lock for a where N>_2 *(col. 6, lines 28-42)*; acquiring one of the N local

locks to perform one of dispatching or wait signaling operation, thereby locking a given subset of the dispatcher database *(col. 6, lines 35-38)*; limiting access of the data items of the given subset to the one of dispatching or wait signaling operation to be performed for that given subset *(col. 1, lines 52-67)*; and concurrently maintaining access to the data items of unlocked subsets of the dispatcher database so that the operating system maintains a substantially operational state *(col. 2, lines 18-30)*. Zolnowsky fails to explicitly teach using a database for the dispatcher. However, Hanrahan teaches using locks with a dispatcher database *(page 2, lines 20-26)*. It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the feature of Hanrahan's dispatcher database with the dispatching locks of Zolnowsky because the dispatcher database holds the states of the threads to be executed on the processor and the locks provide the control/mechanism of the "holding." In addition, Applicant's Admitted prior art section teaches the use of dispatcher databases *(see Specification, page 8, lines 12-14)*.

58. Applicant argues on page 20 of the Remarks that one of ordinary skill in the art would not further combine Frey to Zolnowsky and Hanrahan. Frey merely teaches retrieving and updating objects in an object oriented programming environment. None of the references provide a motivation, teaching or suggestion to combine the references.

In response, the Examiner respectfully disagrees. Zolnowsky, Hanrahan and Frey are all in the same field of endeavor of process scheduling. Therefore, the motivation provided demonstrates that one of ordinary skill in the art would have known to combine the references.

59. Applicant argues on page 20 of the Remarks that there is nothing in the cited combination which teaches defining one or more dispatch groups, each dispatch group including dispatchable objects, made up of any of threads, resources or events, defining one or more local

locks, one for each dispatch group, acquiring one of the one or more local locks, thereby locking a portion of the dispatcher database corresponding to the dispatch group. In addition, Applicant argues on page 21 of the Remarks that there is nothing in the cited combination which teaches defining a plurality of dispatch groups, each dispatch group being made up of any of threads, resources and events that frequently interact with each other, defining one or more local locks that protect items making up each dispatch group, and acquiring one of the one or more local locks for any of the threads, resources and events of a given dispatch group that are touched by a code path of one or more code paths comprising an operating system.

60. In response, the Examiner respectfully disagrees. Zolnowsky teaches a parallel dispatching and wait signaling method for protecting data items of a dispatcher of an operating system, the parallel dispatching and wait signaling method comprising the steps of creating N local locks, each N local lock for a where N>_2 *(col. 6, lines 28-42)*; acquiring one of the N local locks to perform one of dispatching or wait signaling operation, thereby locking a given subset of the dispatcher database *(col. 6, lines 35-38)*; limiting access of the data items of the given subset to the one of dispatching or wait signaling operation to be performed for that given subset *(col. 1, lines 52-67)*; and concurrently maintaining access to the data items of unlocked subsets of the dispatcher database so that the operating system maintains a substantially operational state *(col. 2, lines 18-30)*. Zolnowsky fails to explicitly teach using a database for the dispatcher. However, Hanrahan teaches using locks with a dispatcher database *(page 2, lines 20-26)*. It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the feature of Hanrahan's dispatcher database with the dispatching locks of Zolnowsky because the dispatcher database holds the states of the threads to be executed on the processor and the locks provide the control/mechanism of the "holding." In addition, Applicant's Admitted prior art section teaches the use of dispatcher databases *(see Specification, page 8, lines 12-14)*. In addition, Zolnowski also teaches determining a methodology to form one or more dispatch groups including any of threads, resources, and events that frequently interact with

each other *(col. 5, lines 46-48, and see Abstract)* and evaluating the operating system after said modifying the locking requirements so as to determine if the overall performance of the operating system is acceptable *(col. 5, lines 45-58)*. Zolnowski teaches dispatchable objects *(col. 1, lines 52-67)* but fails to explicitly teach relating dispatchable objects to dispatchable groups. However, Frey teaches an Object Management Group (OMG) that relates objects with group *(col. 1, lines 64-67)*. It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the feature of relating objects with groups in order to enhance the usability, portability, reliability and interoperability of objects *(col. 1, lines 64-67)*. Zolnowski, Hanrahan and Frey fails to explicitly teach when overall performance of the operating system is unacceptable, remodifying the locking requirements of all code paths of the one or more code paths of the operating system until overall performance of the operating system is acceptable. However, Johnson teaches a locking system which remodifies the locking requirements of the operating system based on rules of performance (whether they are acceptable or unacceptable) *(see Abstract, col. 2, lines 61-67 and col. 3, lines 1-57)*. It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the references of Johnson with Zolnowsky, Hanrahan and Frey because this provides the benefit of concurrent dynamic access to control data to the existing locking system of Zolnowsky, Hanrahan and Frey *(col. 1, lines 7-28)*.

61. Applicant argues on page 21 of the Remarks that there is nothing in the cited combination which teaches determining a methodology to form one or more dispatch groups, creating N local locks, one for each dispatch group, evaluating the operating system after said modifying the locking requirements so as to determine if the overall performance of the operating system is acceptable, and optimizing the locking requirements.

Due to the new issues amended in the claim, there is a new ground of rejection. As sated in the rejection, Zolnowski, Hanrahan and Frey fails to explicitly teach when overall performance of the operating system is unacceptable, remodifying the locking requirements of all code paths of the one or more code paths of the operating system until overall performance of the operating system is acceptable. However, Johnson teaches a locking system which remodifies the locking requirements of the operating system based on rules of performance (whether they are acceptable or unacceptable) *(see Abstract, col. 2, lines 61-67 and col. 3, lines 1-57)*. It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the references of Johnson with Zolnowsky, Hanrahan and Frey because this provides the benefit of concurrent dynamic access to control data to the existing locking system of Zolnowsky, Hanrahan and Frey *(col. 1, lines 7-28)*.

Conclusion

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37

CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kenneth Tang whose telephone number is (571) 272-3772. The examiner can normally be reached on 8:30AM - 6:00PM, Every other Friday off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Meng-Ai An can be reached on (571) 272-3756. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Kt
6/11/05

MENG-AL T. AN
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2100